REMARKS

This Amendment cancelled all existing claims and provides a new set of claims where the first, second, third and fourth numbered layers in the process claims and the product claims correspond to each other. The first and third layers have one polarity dopant; the second and fourth layers have an opposite polarity dopant. Independent claims 17, 24 recite that the fourth semiconductor layer is on the second semiconductor layer. Both independent claims have a limitation for a planar insulating layer with openings to the third and fourth layers. The openings are filled with conductive material to establish electrical contact from the upper surface of the planar layer of insulating material to the third layer and to the second layer that lies beneath the fourth layer.

The process provided by the invention and the resulting product enable a manufacturer to provide a near planar bipolar transistor in compound semiconductor material, such as silicon carbide. The references of record do not provide such a process or structure. Instead, the references provide traditional stacked or mesa-like structures. There is an advantage to having planar processes and planar devices. Such processes avoid peaks and valleys in a mesa-like devices which may retain debris or may become broken during processing.

The Morris reference neither has the same structure nor uses the same process. Morris has no planar insulating layer comprising electrical contacts at the surface of the planar insulating layer that extend to the third active layer and to the second active layer via the fourth active layer.

Singh and Sakai also lack the planar insulating layer with its surface contacts extending to third active and fourth/second active layers.

Respectfully submitted,

12/12/05
Date

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